MEMORANDUM

To: All Mineral Mine Operators

From: _____
Conrad T. Spangler, Division Director

Subject: 2002 Risk Assessment

Date: July 26, 2002

The 1994 Virginia Mine Safety Act requires the Director of the Department to schedule additional inspections at underground mineral mines and at surface mineral mines, which are not inspected by the Federal Mine Safety and Health Administration (MSHA). These additional inspections are based on certain factors, which assess each mine's particular risks as compared to other mines in the Commonwealth. In addition to the inspections, training and assistance is available to all mines, especially those identified in the Risk Assessment.

The 2002 Risk Assessment has been completed, using accident and violation data from 2000 and 2001. In a few weeks, Division of Mineral Mining (DMM) Mine Inspectors will begin contacting the mine site supervisors to discuss the Risk Assessment results. The Mine Inspectors will be using the Risk Assessment results to schedule inspections and training during the year.

An explanation of the Risk Assessment process and 2002 frequency ranges are attached. If you have any questions please contact this office at (434) 951-6310, or your Mine Inspector.

CTS/DKB/jkd

Enclosures

2002 Mineral Mining Risk Parameters
(Data Years 2000 and 2001)

SERIOUS INJURY

Mines having a serious injury during the data years of 2000 and 2001 will receive a spot inspection for each serious accident. Surface mines inspected by MSHA will not receive inspections but will be offered training and assistance in accident prevention. Inspections, training or assistance will target the situation, equipment and conditions which led to the accident.

CLOSURE ORDERS

Mines that have received closure orders in the areas of mobile equipment, explosives, ground control and walkways/travelways will receive an additional spot inspection for each closure order in these categories. Surface mines inspected by MSHA will not receive inspections but will be offered training and assistance in accident prevention and safe work practices. Inspections, training and assistance will target the situation, equipment or conditions which led to the closure order.

FATALITIES

Mines that have experienced a fatality during the data years will receive additional inspections due to the fatality investigation as well as additional regular and spot inspections. Surface mines inspected by MSHA will not receive inspections beyond those necessary to conduct the fatality investigation. They will, however, be offered additional training and assistance in accident prevention and safe work practices. Inspections, training and assistance will target the situation, equipment or conditions which led to the fatality.

NEW MINES - NEW OWNERSHIP

New mines and mines under new ownership, by either repermit or permit transfer, will receive additional regular and spot inspections through the first full 12 month Risk Assessment cycle following the opening of the new mine or the change in ownership. Surface mines inspected by MSHA will not receive inspections but will be offered training and assistance in accident prevention and safe work practices.

ACCIDENT FREQUENCY FOR SURFACE MINES

Surface mineral mines will be classified into four risk categories based on accident frequency rates calculated from accident and production data reported to the Division of Mineral Mining in 2000 and 2001.

Category 1	This category ranges from 0 frequency rate to 0.92. The upper limit of category 1 is calculated by dividing the sum of all mine frequency rates by the number of surface mines.
Category 2	This category ranges from 0.92 frequency to 3.86. The lower limit of category 2 is the upper limit of category 1. The upper limit for category 2 is calculated by adding the upper limit for category 1 and the upper limit for category 3 and dividing by 2.
Category 3	This category ranges from 3.86 frequency to 6.80. The lower limit of category 3 is the upper limit of category 2. The upper limit of category 3 is calculated by dividing the sum of all mine frequency rates by the number of surface mines that experienced an accident.
Category 4	This category ranges from 6.80 to 47.14. The lower limit of category 4 is the upper limit of category 3. The upper limit for category 4 is the maximum frequency calculated for a site in the data period.

Category 1 Mines with frequency rates between 0 and 0.92 will receive the minimum number of regular inspections and will be offered training to assist them in maintaining a safe work environment. MSHA inspected mines will not receive inspections but will be offered training and assistance in accident prevention.

Category 2 Mines with frequency rates between 0.92 and 3.86 will receive the minimum number of regular inspections, will receive spot inspections and will be offered training to help them to improve their performance. MSHA inspected mines will not receive inspections but will be offered training and assistance in accident prevention.

Category 3 Mines with frequency rates between 3.86 and 6.80 will receive one regular inspection above the minimum plus spot inspections and will be offered training to help them to improve their performance. MSHA inspected mines will not receive inspections but will be offered training and assistance in accident prevention.

Category 4 Mines with frequency rates above 6.80 will receive additional regular inspections, spot inspections and will be offered training to help them to improve their performance. MSHA inspected mines will not receive inspections but will be offered training and assistance in accident prevention.

ACCIDENT FREQUENCY FOR UNDERGROUND MINES

Underground mineral mines will be classified into three risk categories based on accident frequency rates calculated by MSHA using data they have received from operators in 2000 and 2001.

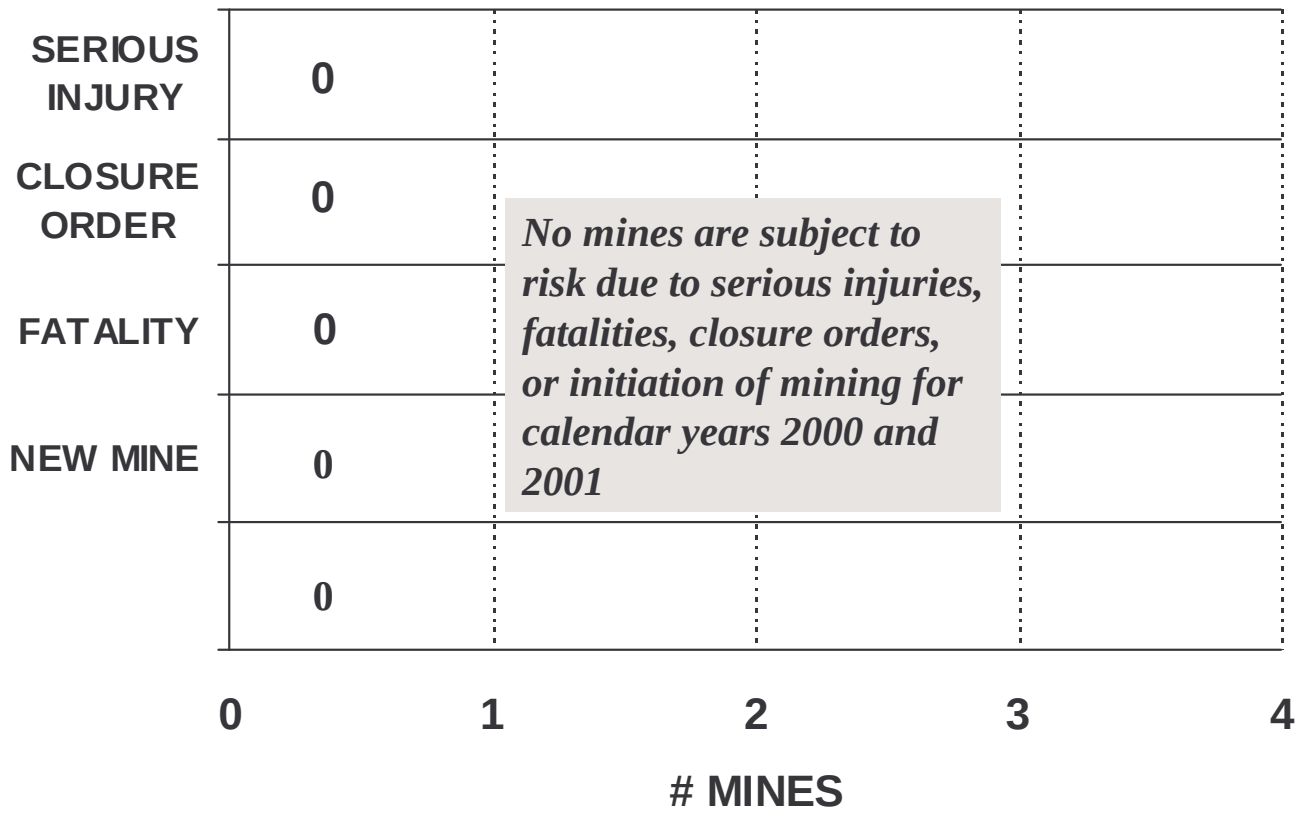
Category 1	This category ranges from 0 frequency rate to 1.18. The upper limit of category 1 is calculated by adding the 2000 and the 2001 Virginia accident frequency rates, as provided by MSHA, and dividing the sum by two.
Category 2	This category ranges from 1.18 frequency rate to 6.79. The upper limit of category 1 is the lower limit of category 2. The upper limit of category 2 is calculated by adding the 2000 and the 2001 National frequency rate, as provided by MSHA, and dividing the sum by two.
Category 3	This category range is greater than 6.79. The lower limit of category 3 is the upper limit of category 2. The upper limit of category 3 comes from the average frequency rates for individual mine sites.

Category 1 Mines with frequency rates between 0 and 1.18 will receive the minimum number of regular inspections and will be offered training to assist them in maintaining a safe work environment.

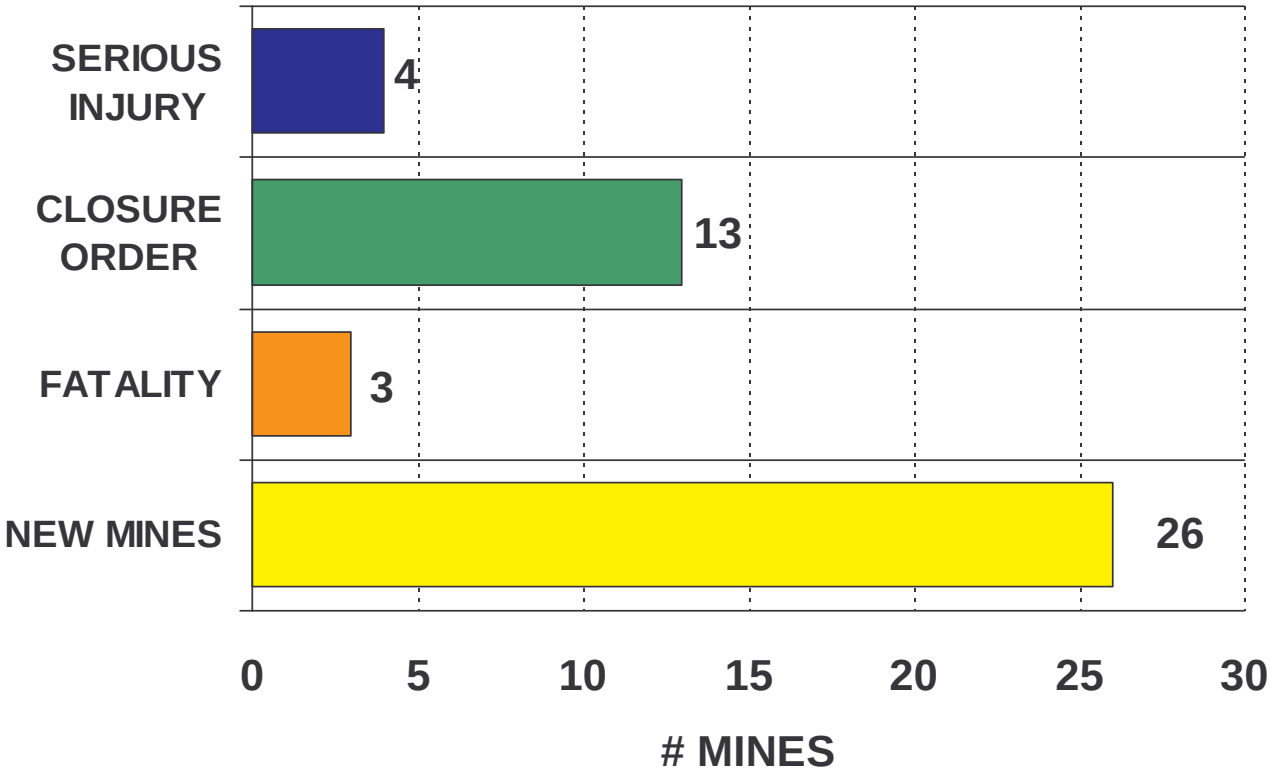
Category 2 Mines with frequency rates between 1.18 and 6.79 will receive the minimum number of regular inspections plus spot inspections and will be offered training to help the mine improve its performance.

Category 3 Mines with frequency rates above 6.79 will receive additional regular inspections, spot inspections and will be offered training to help the mine improve its performance.

2002 RISK ASSESSMENT FOR UNDERGROUND MINES

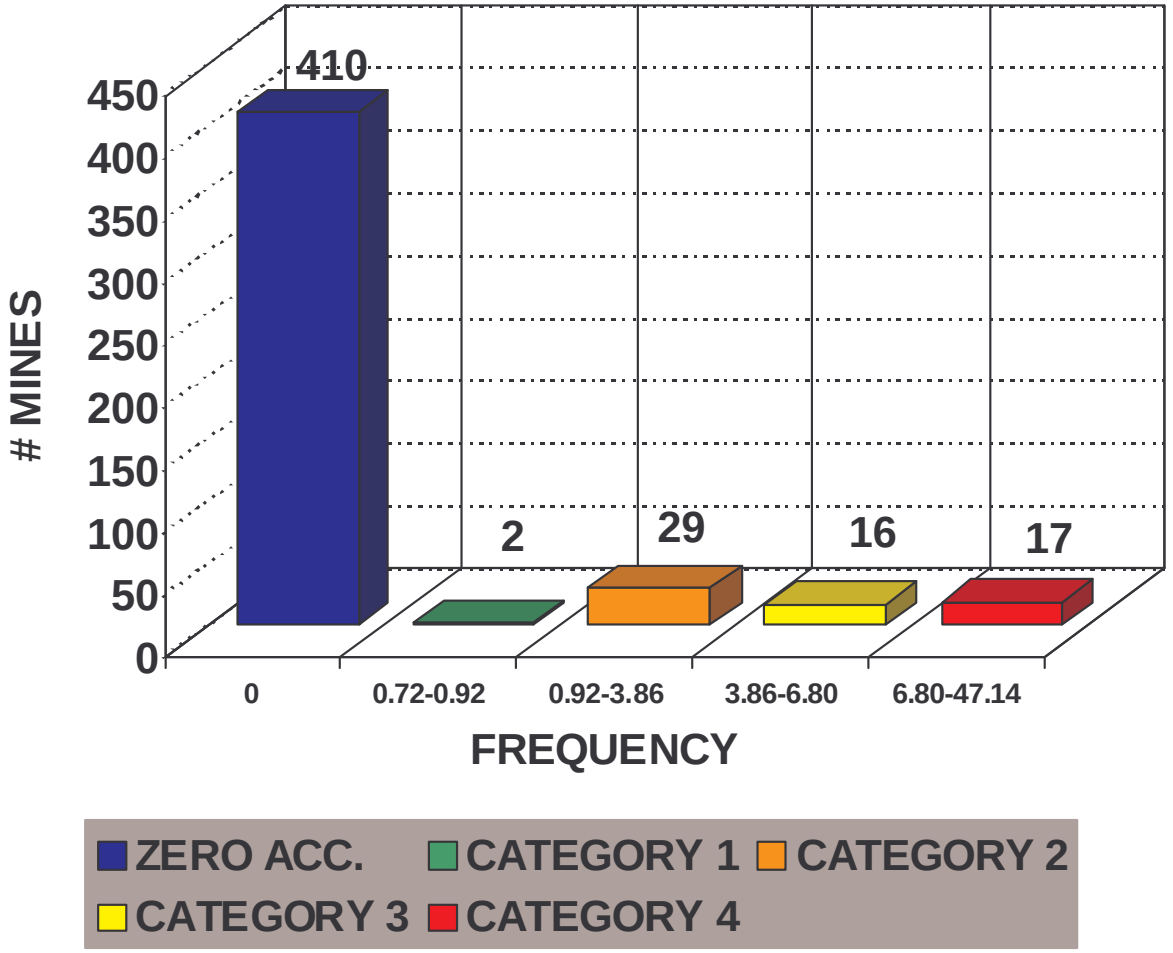


2002 RISK ASSESSMENT FOR SURFACE MINES



2002 RISK ASSESSMENT FOR SURFACE MINES

ACCIDENT FREQUENCY RATE (200,000 MANHOURS)



2002 RISK ASSESSMENT FOR UNDERGROUND MINES

ACCIDENT FREQUENCY RATE (200,000 MANHOURS)